## WHAT IS CLAIMED IS:

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- 1 A power generating wind turbine comprising a nacelle 2 installed on a tower, said nacelle comprising therein or thereon a 3 main shaft to which a wind turbine rotating blade is fitted, a gear-4 box by which a rotation of said main shaft is speeded up to be put 5 out and a generator driven by an output of said gear-box, wherein 6 said main shaft is connected to an end of an input shaft of said gear-7 box and is supported to said nacelle via a single double-row tapered 8 roller bearing.
  - 2. A power generating wind turbine comprising a nacelle installed on a tower, said nacelle comprising therein or thereon a main shaft to which a wind turbine rotating blade is fitted, a gear-box by which a rotation of said main shaft is speeded up to be put out and a generator driven by an output of said gear-box, wherein said main shaft is connected to an end of an input shaft of said gear-box and is supported to said nacelle via a single three-row roller bearing comprising a row of rollers receiving a radial load and a pair of rows of rollers receiving a thrust load.
- 3. A power generating wind turbine as claimed in Claim 1 or 2, wherein said main shaft is formed in an annular shape or a disk shape having its outer diameter made larger than its axial directional length.
- 4. A power generating wind turbine as claimed in Claim 1 or
  2, wherein said main shaft and said input shaft of said gear-box are

- 3 connected to each other via a coupling.
- 5. A power generating wind turbine as claimed in Claim 3,
- 2 wherein said main shaft and said input shaft of said gear-box are
- 3 connected to each other via a coupling.